12-28 Tap Drill Chart

Unified National Fine (UNF) · 28 threads per inch · ASME B1.1

TAP DRILL (73% THREAD)

#14 = 0.1820 in = 4.62 mm

Drills for 12-28 (50–85% thread)

DRILL	INCH	MM	% THREAD	
#11	0.1910	4.85	54%	
#12	0.1890	4.80	58%	
3/16"	0.1875	4.76	61%	
#13	0.1850	4.70	67%	
#14	0.1820	4.62	73%	Recommended
#15	0.1800	4.57	78%	
#16	0.1770	4.50	84%	

Clearance hole (bolt passes through)

FIT	DRILL	INCH	MM
Close	A	0.2340	5.94
Normal	B	0.2380	6.05
Loose	F	0.2570	6.53

Thread dimensions (basic)

DIMENSION	INCH	MM
Major diameter (basic)	0.2160	5.49
Pitch diameter (basic)	0.1928	4.90
Minor diameter, internal (basic)	0.1773	4.50
Pitch (1/28 in)	0.0357	0.91

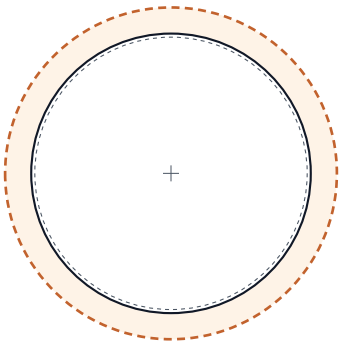
Actual size

Print at 100% scale ("Actual size", not "Fit to page"). Check with the rulers below.



Dashed copper circle: thread major diameter; solid: tap drill hole; dotted: basic minor diameter.

Enlarged 8x:



Tap drill, actual size (4.62 mm):







Scan for the interactive version:

whatsizeis.com/tap-drill/12-28/

Values from the ASME B1.1, ISO 261/68-1 and ASME B1.20.1 thread formulas; drill sizes per ASME B94.11M; clearance holes per ISO 273. Method: whatsizeis.com/how-we-calculate/